# Functions easy-to-use
# Measuring and monitoring relays in 36-mm enclosure
# NEW: with push-wire terminal

**Avoid critical operating states – reduce the risk**

- Modular system for multifunctional monitoring tasks
- Fast r.m.s. value measurement (true r.m.s.*) for a wide frequency range
- Two different alarm stages prewarning/alarm provide information well in advance

**Comprehensive information – measuring instrument not required**

- Measured value memory for displaying the first operating value
- Large LC display for measured value indication and parameter setting
- Optional analogue interfaces (0…10 V, 0(4)…20 mA, 0…400 µA)

**Immediate commissioning – reduces initial costs**

- VME420 and VMD420 feature a preset function for automatic parameter setting
- One-finger operation for settings – no screw driver required
- Imprinted wiring diagram and clearly labelled terminals allow easy installation
- Simply plug in using push-wire terminals instead of screw fastening

# Push-wire terminal: Your advantages at a glance

**Safety is top priority**

The clamping connection is strong so the contact is even more secure than with conventional screw technology.
The push-wire terminal is unaffected by high shock and vibration loads. Furthermore, by using the push-wire technique it is no longer necessary to check screw terminals after transport or at regular intervals. The push-wire terminal provides high contact stability and is maintenance-free.

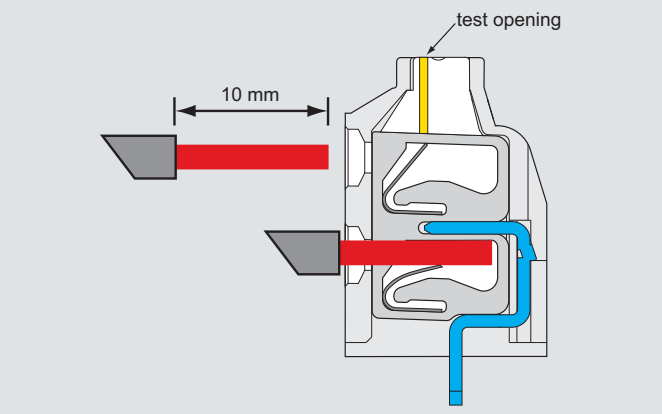
The push-wire terminal, which was specially developed for Bender, holds the wire tight. The clamping force of the springs is always kept constant and provides high vibration and contact stability.

Do you want to check voltages or relay contacts?
No problem – the test opening (ø 2.1 mm) makes it possible to make contact with measurement and test probes safely.

**Your advantages**

- Considerable savings in time
- Reliable clamping
- Improved level of safety
- Long-term contact
- Two terminals are available for each connection

**Quick, safe, stable**




When inserting a flexible conductor with a ferrule and a rigid conductor with a cross section of ≥ 0.75 mm², the spring opens automatically. For cross-sectional areas ≤ 0.75 mm², it is necessary to open the terminal by pressing the button with a screwdriver.

Two wires can be connected at each terminal. Thus, each wire is held by a separate spring. And potentials with current loads of up to 12 A max. can be looped through without any problem.

**Connection and release**

| Wire | Connection | | Release |
|---|---|---|---|
| Rigid<br>0.2…2.5 mm²<br>AWG 24-14 | 0.2…0.75 mm² | 0.2…0.75 mm² | |
| Flexible without ferrules<br>0.2…2.5 mm²<br>AWG 24-14 | | | |
| Flexible with ferrules<br>0.2…1.5 mm²<br>AWG 24-16 | 0.2…0.75 mm² | 0.2…0.75 mm² | |